IN THE CLAIMS:

Please amend claims 1 and 6 as follows:

1. (Currently Amended) A method for removing a predetermined region of a coating of a polymer-coated glass capillary tube, comprising the steps of:

raising a temperature in a reaction chamber in which the predetermined region of the polymer-coated glass capillary tube is arranged; and

reacting the predetermined region of the glass capillary tube with a reactive gas containing O₃ gas introduced into the reaction chamber so as to form the coating with a gradually decreasing thickness, the thickness decreasing in a predetermined certain area of the polymer coated glass capillary tube towards the predetermined region with the coating removed therein.

2. (Previously Presented) A method for removing predetermined regions of coatings of a plurality of polymer-coated glass capillary tubes, comprising the steps of:

raising a temperature in a reaction chamber, where the predetermined regions of the plurality of polymer-coated glass capillary tubes are arranged to form a plane and where the outer surfaces of the capillary tubes partially make gaps of 0.1 mm to 10 mm with the inner wall of the reaction chamber; and

reacting the predetermined regions of the glass capillary tubes with a reactive gas containing O₃ gas introduced into the reaction chamber.

- 3. (Original) A method for removing a coating of a polymer-coated glass capillary tube according to claim 1, wherein the temperature in the reaction chamber is raised to 150°C to 400°C, and the reactive gas containing O₃ gas having a concentration of 0.5% to 10% by volume is supplied to the reaction chamber where the pressure in the reaction chamber is smaller than atmospheric pressure.
- 4. (Previously Presented) A method for removing a coating of a polymer-coated glass capillary tube according to claim 1, wherein the temperature in the reaction chamber is raised to 100°C to 400°C, the reactive gas containing O₃ gas having a concentration of 0.5% to 10% by volume is supplied to the reaction chamber where the pressure in

the reaction chamber is smaller than atmospheric pressure, and ultraviolet rays are radiated to the reaction chamber.

5. (Withdrawn) A glass capillary comprising

a first region where it is coated with a polymer of a generally constant thickness,

a second region where a surface of the glass capillary being exposed for a predetermined length in the longitudinal direction, and

a third region provided between the first and second regions, covered with a tapered polymer coating whose thickness becomes thinner from the first region to the second region, wherein a slope of the surface of the coating of the third region makes an angle of 70 degrees of less with the longitudinal direction of the capillary tube.

6. (Currently Amended) A method for manufacturing a polymer-coated glass capillary tube having a predetermined region of a coating of the polymer coated glass capillary tube removed comprising steps of:

providing the polymer coated glass capillary tube;

raising a temperature in a reaction chamber in which the predetermined region of the polymer-coated glass capillary tube is arranged; and

reacting the predetermined region of the glass capillary tube with a reactive gas containing O_3 gas introduced into the reaction chamber so as to form the coating with a gradually decreasing thickness, the thickness decreasing in a predetermined certain area of the polymer coated glass capillary tube towards the predetermined region with the coating removed therein.

- 7. (Previously Presented) A method for manufacturing a polymer-coated glass capillary tube according to claim 6, wherein the temperature in the reaction chamber is raised to 150°C to 400°C, and the reactive gas containing O₃ gas having a concentration of 0.5% to 10% by volume is supplied to the reaction chamber where the pressure in the reaction chamber is smaller than atmospheric pressure.
- 8. (Previously Presented) A method for manufacturing a polymer coated glass capillary tube according to claim 6, wherein the temperature in the reaction chamber is raised

to 100°C to 400°C, the reactive gas containing O₃ gas having a concentration of 0.5% to 10% by volume is supplied to the reaction chamber where the pressure in the reaction chamber is smaller than atmospheric pressure, and ultraviolet rays are radiated to the reaction chamber.

- 9. (Previosuly Presented) A method for manufacturing a polymer-coated glass capillary tube according to claim 6, wherein a coating material is polyimide.
- 10. (Canceled)
- 11. (Previously Presented) A method for manufacturing a polymer-coated glass capillary tube according to claim 6, wherein the reacting gas containing O₃ gas is an oxygen gas containing O₃ gas.
- 12. (Previously Presented) A method for manufacturing a polymer-coated glass capillary tube according to claim 6, wherein the polymer coated glass capillary tube is arranged perpendicular to a flow of reactive gas.
- 13. (Previously Presented) A method for manufacturing a polymer-coated glass capillary tube according to claim 6, wherein ultraviolet rays are radiated to the reaction chamber.